

Refuge/complex name: McNary NWR

Project title: Burbank Slough yellow starthistle eradication

Total amount requested: 30,000

Project description:

Eradicate yellow starthistle (*Centaurea solstitialis*) from 600 acres of shrub-steppe habitats on the eastern edge of the Burbank Slough unit.

Distinct project with well-defined objectives (10 points):

This project is supported in the McNary CCP by Goal 7a: Improve Shrub-Steppe Condition. The strategy is to reduce competition of yellow starthistle to native grasses and forbs. This project will provide funding for a contracted weed crew to conduct a large scale (600 acre) fall herbicide (Chaparral) treatment on yellow starthistle. Fall application of Chaparral provides control of yellow starthistle as well as suppression of cheat grass. Project will include 4 acres of plug planting for areas with low presence of native grasses.

Comment [BF1]: Hmmmm. Seems kinda random, but okay.

Potential for maximum control/Likelihood of success (10 points):

This parcel was selected because it is isolated from other shrub-steppe locations by adjacent private lands (largely agricultural) that are clear of yellow starthistle will minimize the opportunity for re-infestation. This herbicide application method has worked successfully at McKay NWR where initial treatments of aminopyralid products have provided multiyear control at a 90%+ success rate after the first year of treatment. Two years of spot treatment is expected and will be conducted by refuge personnel.

Biological benefit to priority species or BIDEH (10 points):

Walla Walla County has only 33% of the original shrub-steppe habitat remaining compared to pre-European settlement of the area. The treated parcels will provide primarily grassland habitat, and act as migratory pathways and breeding locations for grassland obligate breeders (USFWS Focal Species: Grasshopper sparrow). This unit is immediately adjacent to management parcels where seeding and plantings to enhance pollinator habitat are occurring. The aggressive treatment on yellow starthistle would prevent or retard the invasion of yellow starthistle into these adjacent parcels where control would be more difficult due to plant species vulnerability to broadleaf herbicides.

Comment [BF2]: Awesome!

Sustainability (10 points):

Past experience has shown that initial herbicide applications of aminopyralid products on yellow starthistle are over 90% successful. Spot treatments to control missed or surviving plants will be provided for by refuge personnel. It is anticipated that these follow-up treatments will be accomplished in a short period of time compared to manpower intensive initial attack. These treatments will become part of the annual workplan for this unit.

Comment [BF3]: How intensive is this initial attack?

Monitoring to document and evaluate project success (10 points):

Pre-treatment weed mapping for this unit was completed in 2014, findings were imported into GIS. Mapping of follow-up spot treatment applications following the same mapping protocols will provide documentation of project success.

Budget:

Budget: 40,000

Slough 3 sage-steppe (400 acres): Herbicide Application: \$18,000

Slough 2 sage-steppe (200 acres): Herbicide Application: \$9,000

4.5 acres of plug planting of native grasses: \$10,000

Refuge will provide chemical for up to 360 acres: Needed chemical to fully complete the project: \$3000

Funding for this project will be obligated in FY15, actual execution of contracted services will occur in fall of FY16.

If complete funding is not available, funding for this project could be split into either the Slough 3 or Slough 2 portions.

Comment [BF4]: \$18,000 to apply herbicide on 400 acres? Why is this so expensive?

Comment [BF5]: What is key about these 4.5 acres amongst the 600 acres treated?